



## Early Journal Content on JSTOR, Free to Anyone in the World

This article is one of nearly 500,000 scholarly works digitized and made freely available to everyone in the world by JSTOR.

Known as the Early Journal Content, this set of works include research articles, news, letters, and other writings published in more than 200 of the oldest leading academic journals. The works date from the mid-seventeenth to the early twentieth centuries.

We encourage people to read and share the Early Journal Content openly and to tell others that this resource exists. People may post this content online or redistribute in any way for non-commercial purposes.

Read more about Early Journal Content at <http://about.jstor.org/participate-jstor/individuals/early-journal-content>.

JSTOR is a digital library of academic journals, books, and primary source objects. JSTOR helps people discover, use, and build upon a wide range of content through a powerful research and teaching platform, and preserves this content for future generations. JSTOR is part of ITHAKA, a not-for-profit organization that also includes Ithaka S+R and Portico. For more information about JSTOR, please contact support@jstor.org.

THE  
QUARTERLY JOURNAL  
OF  
ECONOMICS

---

MAY, 1905

---

THE DIVISION OF INCOME.

THE two greatest ends of economic inquiry seem to me to be the furnishing of general answers to the two questions, first, why whole communities are rich or poor, and, secondly, why inside each community some individuals and families are above and others below the average in wealth. Assuming that the communities are isolated, or, at any rate, that they neither receive nor pay tribute, the first question is answered by a theory of production, and the second by a theory of distribution. The riches or poverty of the whole community depend, as Adam Smith declared at the very outset of his *Inquiry*, upon the annual produce per head of population. The comparative wealth of individuals and families within any given community depends upon the proportions in which the total produce or income (the expressions are synonymous in a self-contained community) is distributed or divided among them.

I do not think the theory of production has by any means reached perfection. There is a want of unity and simplicity in current expositions of it which is largely respon-

sible for its entire failure to penetrate the public mind, and consequently for the wide-spread prevalence of those ridiculous delusions which disfigure the writings of journalists and the speeches of politicians all the world over. But the theory of distribution, as now generally taught, has still more fundamental defects; and it is to these that I propose to draw attention, in the hope that others may be more successful in amending them than I have hitherto been.

To the ordinary person who has not been infected by the study of economic text-books, the term "the distribution of wealth" has a very definite, intelligible, and useful meaning. "Wealth" means income, and "distribution" means division. An "equal distribution" means an equal division: a "change in distribution" means a change in the proportions in which the total is divided. The total income of the United Kingdom is valued at £1,750,000,000: it is distributed between the 43,000,000 inhabitants in certain proportions. It is also distributed between the two different categories, "property," or land and capital, on the one hand, and "labor," on the other, a certain proportion coming in to its receivers because they own property, and another proportion to its receivers because they perform labor. Neither as to the distribution between individuals nor as to that between categories are the available statistics at all complete or accurate, but they are sufficient for purposes of illustration. We know that incomes vary from something over one five-thousandth of the whole down to nothing at all. We know that the whole of the property is valued at £15,000,000,000, and that the average rate of interest is somewhere not very far removed from  $3\frac{1}{2}$  per cent., which will make the share of the total income derived from property about £525,000,000, or 30 per cent. of the whole, leaving 70 per cent for labor.

There is of course no reason to suppose that the distri-

bution is the same at all times or in the different countries at the same time. It has doubtless been in the past either more or less unequal than at present, and its inequality has doubtless been of a somewhat different character. It is doubtless not the same in the United States and in Switzerland. Has theoretic economics nothing to say on the subject, no generalizations or "laws" to lay down? Can it not tell us in a general way what are the causes of greater or less inequality, what are the causes of the existence of a larger or smaller middle (near the average) class, what are the causes of the existence of a small very rich class or of a very large extremely poor class? Can it say nothing as to the reasons why property gets 30 per cent. of the income now and, say, only got 25 per cent. in the reign of Elizabeth?

Economists sometimes vaguely wonder why economic theory is so unpopular that books upon it have very small sale, and in the greatest centres of population lectures on it by the best professors will attract at the most an audience of forty or fifty, and usually much fewer than that. Is there anything in this to excite surprise, if we reflect for a moment on the inadequacy of the answer furnished by the theory of distribution, as at present taught, to the questions in which the ordinary person is interested?

A young man passing through a fashionable street or square in one of our great modern capitals at the proper time of day may see a woman, feeble in body and mind from never having done a stroke of honest work in her life, being drawn along in a handsome carriage by a pair of magnificent horses, with two noble-looking men on the box. The carriage stops at a door, one of the men gets down, the door opens and displays two flunkeys in gorgeous array, they receive a small piece of pasteboard, and an important social function is over. The observer proceeds on his way, and soon passes down a mean street inhabited by a hun-

dred families whose united possessions would not equal in value the carriage and horses, and whose average income might perhaps be equal to a third or a fourth of the cost of clothing the lady for a single ball. Struck by the contrast, he begins to wonder why it is so, and whether it must always be so, and whether it may not be necessary to take steps towards altering it. He has probably heard that some people say such contrasts are due to the existence of private property in land or in the instruments of production. He has heard vaguely, too, that economics deals with this kind of topic, and he therefore resolves to attend some lectures given by a professor of economics.

The professor tells him that the produce of the community is distributed into three or four great shares,—rent, interest, wages, and perhaps profits. Rent, he will teach, is determined by the quality and situation of the land, and this he will be sure to illustrate by a diagram on his blackboard. Putting together a number of rectangles of equal breadth, but gradually diminishing height, he will tell his class that each rectangle represents the return to an equal unit or “dose” (the class laughs politely) of capital and labor, the taller rectangles being the return on the earlier, and the smaller the return on the later units of capital. Taking his chalk in his hand, he then draws a horizontal line from the top of the shortest rectangle to the outside of the tallest, and observes triumphantly, “The amount above that line constitutes rent.” Of course there is no amount there, nothing but a certain space on the blackboard. “At least,” he explains, recollecting himself, “it represents rent.” If a student ventures to ask, “The rent of what?” he will explain: “Not the rent of all the different acres of land, but the return to all the units of labor and capital. On some acres it will be found possible to apply a great many units yielding a return higher than that of the marginal unit,

on others few, and the rents will differ accordingly. The rent of any particular acre will be the surplus return from all the doses which can be applied to that particular acre. How many doses it will be possible to apply to all the land, and therefore what the rent of the whole will be, will depend upon a number of different circumstances." Asked what a "dose of labor and capital" means, he will probably explain that it means a definite amount of expenditure in wages of labor and interest of capital. He may possibly conclude his "theory of rent" with a few rather hesitating words as to the effect of "progress" on the total rent. The impression left on the intelligent student's mind is that he has been treated to an interesting intellectual exercise, but that he does not know any more than he did before about distribution. He knew before he went that people who possess land will not usually let it for less than it is worth, and that people who rent land will not usually pay more; and he knew, too, that some land is worth a great deal, and some little or nothing. He has not now been told at all clearly what makes some land worth more than other land, and, what is more important, that was not what he came to find out. What he came to find out was whether rent is becoming a larger and ever larger proportion of the whole income of the community, and why some people have so much rent and others none at all. He very probably even wanted to know whether he ought to vote for candidates who promised to abolish rent altogether. He would be much less inclined to do so if the professor had given him reason to believe that rent is a decreasing proportion of the whole income, and is likely to be more equally distributed in the future. He wanted bread, and the professor has given him a stone. Buttonholing the professor after a lecture, he places his difficulties before him. The professor has some trouble before he can understand, and then he says: "Ah! I see. But those are historical

and statistical questions with which I have nothing to do."

Proceeding next to the problem of interest, the professor talks of the real or apparent differences in the rates of interest obtainable in different kinds of businesses, and then explains the causes of the general highness or lowness of the rate. If an admirer of every new thing, he will give his class the impression that the rate is determined by the comparative estimation in which people hold present and future goods. If more careful, he will show them how at any given time an almost infinite number of means of utilizing capital are known, but that these vary in productiveness; that the capital is never large enough to occupy them all, so that the most productive known, or generally known, are the only ones occupied, and the rate of interest is determined by the return of the marginal one,—that is to say, the lowest-yielding one which must be occupied in order to find employment for the whole mass of the capital. Then he will show how increase of population tends to raise the returns, and how increase of capital tends to necessitate the pushing of the marginal investment lower down. He will endeavor to explain how some inventions raise the rate by disclosing new and highly productive means of utilizing considerable amounts of capital, thus raising the margin, while other inventions reduce the rate by disclosing easy direct ways of doing something hitherto accomplished in difficult roundabout ways, thus setting free a portion of the capital and leading to a lowering of the margin. All this is interesting and more instructive than the "theory of rent," but again our inquirer is dissatisfied. He does not much care about the trifling differences which may exist between the average interest obtainable in different businesses or investments; he does not even care very much about the rate of interest in general. He may be acute enough to perceive that, though a

high rate of interest looks unfavorable to the worker at first sight, it has, at any rate, the advantage of making it easy for the worker who can save anything to accumulate a considerable capital himself. What our inquirer is in search of is rather some light on the question why some people get so much interest and others none at all, and whether the proportion of the whole income of the community falling to interest is likely to increase in the future. If he is satisfied that the proportion falling to interest is likely to increase, or that the inequality of the present distribution of interest is likely to increase largely in the future, he may be determined to join a socialist organization. Again he catches the departing professor, and lays his troubles before him. The professor has greater difficulty than before in comprehending. He is so used to regarding interest as something calculated as a ratio on the principal that he cannot at first see or understand any one wanting to know its ratio to the produce. Moreover, the old books among which he was brought up always confused the two. However, at last he is made to comprehend. "That again," he will say, "is a statistical question. I cannot say I have thought of the subject at all." The other question, as to the inequality of the distribution of interest, would not trouble him in the least. "It depends," he would say, "on the distribution of the capital, and we are not concerned with that."

So far our inquirer into distribution has been told something about the rent of different qualities of land, or, at all events, the returns to different "doses of labor and capital" on different qualities of land, and something about the rate of interest, or ratio between interest and capital. He is disappointed; but there is still wages to come, and he may get some light on distribution from the professor's golden words on that subject. "Surely," he will think, "the professor will not be able to consider wages in re-

lation to distribution without telling us something of the causes which determine how the whole produce is divided between the workers and the owners of property in land and capital."

But he is wrong. The professor, if up to date, teaches that wages are settled by demand and supply, and equal the product of the marginal laborer, the man who may be taken on or put off without making any appreciable difference to his employer. It is impossible to select one out of a number of equal laborers as the marginal one. They are all paid the same, and what they are paid is, or is equal in value to, their true contribution to production. The position of the margin may be either raised or lowered (according to circumstances connected with the law of diminishing returns) when the number of men offering to labor increases. Consequently, the supply of labor affects its remuneration. The supply is regulated by the standard of life. And so on, a somewhat difficult theory, interesting enough in itself, but not enlightening, so far as distribution is concerned. The earnings of the marginal worker and of all workers, measured as they are by their absolute amount, may vary widely without affecting the distribution of the total income between the workers and the owners of property. Our inquirer goes home in a rage, and will attend the professor's lectures no more. Can we wonder?

If, however, he had had a little more patience, he would at last have heard something about distribution. The professor would have dealt with differences of wages in different occupations, and here he would really have considered the distribution of wages as between persons employed in different employments. He would have asked his class to begin with assuming as a working hypothesis that they would expect free competition to make wages in all occupations equal, or, in other words, that they would expect wages to be equally divided, at any rate between wage-

earners of equal industry and ability. He would then explain why this is not actually the case. He would say, for example, that the occupations for which expensive training is necessary get more than the average, because, so far, their number has been kept down by the lack of sufficient well-to-do and self-denying parents or benefactors (including the State). He would say that the lowest kinds of labor are paid less than the average, because they are the kinds in which the all-round incompetent can best be employed, and because the number of all-round incompetents is large enough to fill them to overflowing, so that the value of that kind of work is so reduced that, if an able and competent person was employed (even at piece-work) in such an occupation, he would not get wages as high as the average for all occupations. He would say that the persons employed in some occupations get less than the average because of the tendency of mankind to miscalculate chances all in the same direction, so that the mistake of one man is not compensated by the opposite mistake of another.

The fact that the whole subject of "Distribution" is not treated in the text-books in the same logical and useful manner as the distribution of wages between persons following different occupations seems to be due merely to certain almost accidental circumstances and a somewhat blind following of a traditional arrangement of subjects. There are no such blind followers of tradition as those theorists who neglect the study of the previous history of the theories which they are endeavoring to develop; and the most hardened apologist must admit that the economists of the first half or three-quarters of the nineteenth century were apt to regard the work of their predecessors in a somewhat unhistorical spirit.

The term "distribution" in economics seems to have originated with the Physiocrats. What they meant by it

is not very easy to explain, inasmuch as the explanation involves an understanding of the *Tableau Économique*. But there seems to be little doubt that neither the Physiocrats proper nor Turgot took it to mean the same as *répartition*, or division. They were thinking rather of the machinery for conveying the produce from the producers to the consumers than of the proportions in which it was to be divided among them. When Adam Smith wrote the title of the First Book of the *Wealth of Nations*, in which he speaks of the "order" according to which the produce of labor "is naturally distributed among the different ranks of the people," he was probably using the verb "distributed" in the corresponding sense. When he comes to the subject in the body of the work, he uses "parcelled out" as a synonym for "distributed." He says that just as the price of any particular commodity resolves itself into wages, profit, and rent, so all the commodities together are parcelled out or distributed between the various members of the society as wages, profit, and rent. Then he goes on to consider wages, profit, and rent far more as component parts of price than as portions of revenue. So much is this the case that there seems little doubt that the parcelling out or distribution was an afterthought, and that the chapters on wages, interest, profit, and rent, would not have been materially different from what they are if Adam Smith had never come across the idea.

The term might, of course, have continued to be used in the sense of parcelling out. It might have continued to refer to the processes and mechanism of the division rather than to the terms of the division. However, it did not. The beginning of the change is visible in the first edition of J.-B. Say's *Traité* (1803). Say distinctly undertakes to inquire not only into the different ways in which values spread themselves throughout (*se repandent*

*dans) the society, but also into the proportions according to which they are distributed (*les proportions suivant lesquelles elles se distribuent*). He does not, however, carry out his undertaking, but treats of the various kinds of incomes and of the rise and fall of wages per man, profits per cent., and rent per acre, very much in the same way as Adam Smith. It seems probable that he was talking loosely when he mentioned proportions, and that it did not occur to him that the three things just mentioned were not reckoned by proportions. In the "Epitome," or vocabulary of economic terms, which he affixed to the second edition, he merely describes how distribution operates through the buying by the entrepreneur of productive services, and says nothing about the terms of division. Ricardo went much further than Say. In the preface to his *Principles* he says that the produce is divided between the usual three classes, that at different times "the proportions of the whole produce of the earth which will be allotted to each of these classes under the names of rent, profit, and wages, will be essentially different," and that "to determine the laws which regulate this distribution is the principal problem in political economy." Though, it must be admitted, without much success, he continually endeavors to keep this problem before him. From this time forward the old sense of distribution as the process of parcelling out may be regarded as superseded. "Distribution" was ordinarily defined as the determination of the proportions in which the produce is divided, and the part of economic treatises headed "Distribution" was commonly devoted to a discussion of any points which happened to occur to the writer in connection with rent, interest, wages, and any other share of produce which he might think it desirable to create. The question of proportions so definitely raised by Ricardo and so plainly expressed in the definitions of "distribution" was lost*

sight of, partly because it was supposed by many that rent might somehow be excluded altogether and that the rate of interest or profit showed how the remainder was divided between labor and capital, and partly because of the continued influence of the Smithian tradition.

Whether this be the exact explanation of the present state of things or not, I do not think any one will have the hardihood to assert that the exclusion from expositions of economic theory of any consideration of the causes which determine the division of the whole income between labor and property and the division of property's share between individual proprietors has been deliberate. I know of no economist who has asserted that a consideration of these matters is not a proper part of the theory of distribution, though no doubt there are many who, like my typical professor, would say so, when blamed for omitting it. Put upon his defence, the exclusionist would, I suppose, allege: (1) that the doctrines at present taught as to wages, interest, and rent, tell us what settles the proportions in which the whole income is divided between labor, land, and capital; (2) that no general theory on the questions suggested can be constructed; (3) that the questions are unimportant and not worth answering. I will deal with these allegations in order.

The first of them is easily dealt with. No intelligent person who has considered the subject for a moment can imagine that any investigation of the causes which determine wages per head, interest per cent., and rent per acre, can provide directly an answer to the question, What regulates the proportions in which the produce is divided between wages, interest, and rent? A rise of wages per head is often coincident with a decrease in labor's proportion of the whole income. In our previous example, if the number of workers be put at 30,000,000, the average earnings would be £40 16s. 8d. If the total income were

increased to £2,000,000,000, and the average earnings to £50, the number of workers remaining the same, then the total earnings would be £1,500,000, which is 75 per cent. of the whole,—a larger proportion than the original 70 per cent. But, if the increase of earnings were only to an average of £45, or £1,350,000 in all, then labor's proportion would have sunk from 70 per cent. to  $67\frac{1}{2}$  per cent.

So, too, a fall in the rate of interest does not necessarily indicate a fall in the proportion of the whole income obtained by capital, no matter where we draw the line or whether we draw any line at all between land and capital. The rate of interest is only the rate, ratio, or proportion between the principal and the interest. What proportion the interest bears to the total income cannot be discovered till we know two other things, the amount of the capital and the amount of the total income. To return to our example, if we suppose the £15,000,000,000 worth of property to consist of £10,000,000,000 of capital and £5,000,000,000 of land, then in the state of things at first supposed, with interest at  $3\frac{1}{2}$  per cent., capital will be getting £350,000,000, or 20 per cent. of the total income. Now, if the capital increases to £13,500,000,000, while the total income increases to £2,000,000,000, a fall of interest from  $3\frac{1}{2}$  to  $3\frac{1}{3}$  will be coincident with a rise in capital's income from £350,000,000 to £450,000,000; that is, from 20 per cent. of the whole to  $22\frac{1}{2}$  per cent.

And, finally, it surely needs no elaborate demonstration to prove that a rise in the absolute amount of rent paid for a given quantity of land does not necessarily indicate any rise in the proportion of the whole income of the community falling to the landlords.

The second defence is alternative to the first. It admits that the two problems we are discussing are not really dealt with in the ordinary expositions of the theory of distribution, but alleges that there is little or nothing to

be said about them which can properly be regarded as worthy of the name of theory. "What," I shall perhaps be asked, "have you to say about them?" Little enough, I admit; but if the subject had been discussed as it ought to have been for the last century, there would probably have been by this time quite a large body of doctrine relating to it. I will endeavor to suggest briefly the main outlines of the theory which seems to me to be required.

The division of the whole income between labor and property will be determined by the comparative *total* values of two great collections of contributions to the income: on the one hand all the services of all the workers, on the other all the assistance, or whatever the reader may prefer to call it, afforded by the property. If all the services of the workers are worth 1,225 millions and all the assistance afforded by the property is worth 525 millions, it is obvious that the workers are getting 1,225 millions out of 1,750, and therefore 70 per cent. of the whole.

In considering what settles the comparative values of the two contributions, let us first suppose that the quantities of labor and capital remain fixed, or in the same relation to one another. Here we have the problem in its simplest form, since any alteration in the value of units will necessarily be accompanied by a corresponding alteration in the aggregate value of all the units. If one set of persons have a given number of oranges and another a given number of apples, any alteration in the value of one apple in oranges, or, which is the same thing, of one orange in apples, will result in a similar movement in the aggregate values. Suppose that there are 2,625 apples and 1,225 oranges, and that the value of an apple is one-fifth of an orange. Then the aggregate value of the apples is 525 oranges, and the oranges are to the apples as 1,225 to 525. If, now, the value of an apple falls to one-seventh of an orange, the aggregate value of all the oranges will be to

the aggregate value of all the apples as 1,225 to 375. In the case of apples and oranges it is easily apprehended that changes of fashion or changes in the knowledge of how best to use apples and oranges may change their relative value. If it becomes the fashion to drink orangeade and to despise cider, the value of oranges measured in apples will be enhanced; and, if somebody discovers a way of easily making a delightful jam out of apples, the value of apples measured in oranges will be enhanced.

So with the contributions of labor and property. Fashion is, perhaps, unimportant in practice; but we can imagine changes of fashion which would seriously affect the comparative values of the contributions. If it became the fashion to despise house-shelter, a vast mass of existing capital would be depreciated; and, if we allow it to be gradually replaced by an equal amount of other capital, there is reason to believe that the remuneration of the services of this new capital would be less than that of the services of the houses, since the fact that this investment was not adopted before shows it to have been less profitable than those which had been adopted.

Whatever may be said of changes of fashion, there can be no doubt as to the importance of new inventions in affecting the comparative values of the two contributions. A discovery which shows how things now done by the aid of elaborate machinery could be done easily by unassisted labor will raise the value of the given quantity of labor as compared with that of the given land and capital. If land or anything else that is of a permanent character is concerned, the problem is fairly simple, and has, in a way, been recognized in the traditional discussion about the effect of "improvements" on agricultural rents. When renewable things are concerned, it is often very difficult to decide whether a particular invention is likely to be favorable or unfavorable to an increase in the proportion

falling to property. What shall we say, for example, of the invention of the bicycle? If there were a million horses and a million riders and no more, and all that had happened was merely a substitution of a million bicycles for a million horses, then, given that a bicycle may be taken as containing half the capital there is in a horse, a capital equal to 500,000 horses would be driven into less profitable employment, and the annual value of property's contribution would clearly fall in comparison with that of labor. But, if after the invention it was found profitable to establish a capital of three million bicycles, then a portion of capital equal to half a million horses hitherto in less profitable employments would be withdrawn from them into what would by hypothesis be a more paying investment. Thus both the given quantity of labor and the given quantity of property would get a larger absolute amount; and there seems no reason to doubt that the increase falling to property may sometimes be large enough and sometimes not large enough to give it an increased proportion of the whole income.

Of course, the supposition of fixed amounts of labor and property is a very unreal one. The amounts of both are constantly changing, and not always changing in the same direction at the same rate. Let us return for a moment to our world of oranges and apples. Instead of dealing with fixed amounts, let us allow the number of oranges and apples to vary, but still inquire into the comparative total value of all the oranges taken together, on the one hand, and all the apples taken together, on the other. We want to compare the value of the apple-harvest with that of the orange-harvest. We are at once confronted with what von Wieser calls the "paradox of value."<sup>1</sup> An increase in the number of apples tends to reduce the value of each apple, so that it may happen that an increase in the number

<sup>1</sup> *Natural Value*, Book I., chap. x. pp. 27-32 (Malloch's translation).

of apples will reduce the aggregate value of the apple-harvest as compared with that of the orange-harvest. Suppose again that the apples number 2,625 millions and the oranges 1,225 millions, and that one orange is worth 5 apples, so that the aggregate value of the apples will be 525 oranges, or 30 per cent. of the aggregate value of the apples and oranges taken together. Suppose further that in the next year the number of apples is increased to 3,600 millions, while the oranges remain at 1,225, then the value of an apple measured in oranges will be less than before. If it only falls to one-sixth of an orange, the aggregate value of the apples will be to that of the oranges as 600 to 1,225, and be nearly 33 per cent. of the aggregate value of apples and oranges taken together. But, if the value of an apple falls to one-eighth of an orange, then the aggregate value of the apples will be to that of the oranges only as 450 to 1,225, and will consequently have fallen from 30 per cent. of the aggregate value of apples and oranges taken together to a little under 27 per cent.

As with the aggregate value of the apples and oranges in this example, so with the aggregate value of the contributions of labor and property. If the quantity of either could be increased in proportion to that of the other without any diminution in the value of each unit, then every such increase would increase the proportion which the aggregate value of that contribution would bear to the aggregate value of the contribution of the other factor, and consequently would increase the proportion of the whole income received by that factor. But increase of quantity tends to diminish the value of each unit, and may diminish it so much that the larger quantity is of less proportionate value. For example, let us suppose that at first the number of workers is 30 millions and the value of their work is 1,225 millions, while the value of the use of the property is 525 millions. Then suppose the

workers increased to 35 millions. We may be sure the arrival of the new workers will not simply increase the value of the contribution of labor by one-sixth to 1,429 millions, leaving property's share at the old figure of 525. The new 5 millions will cause some depreciation of a man's work as compared with the use of an acre of land or a house or any particular machine. This depreciation may or may not be great enough to counterbalance the immediately favorable effect of an increase of quantity. For example, the combined effect of the two influences may be to raise labor's contribution to the value of 1,400 millions and property's to 550, thus giving labor nearly 72 per cent. of the whole income, or the effect may be to raise labor's contribution only to 1,325 millions and property's to as much as 625, thus reducing labor's proportion to less than 68 per cent.

The very inadequacy of these remarks, and possibly their incorrectness, will, I think, convince the reader that theory on the subject of the division of income between property and labor would be a very interesting and useful addition to the ordinary presentation of economic principles. It would be so especially if well illustrated by actual historical examples. I am not aware that economic historians have as yet devoted any attention to the question. I should be inclined to suppose that the proportion falling to property has increased and is still increasing. The increase in the quantity of capital has been much greater than the increase of population, and, in consequence of the tendency of invention to open new wide fields for capital, the depreciation of units has not been very large. Nor do I see any reason for doubting that the increase of property's proportion will go on in the future. All that seems certain is that, if it does go on, it cannot go on indefinitely at the same rate. After a certain point it must increase slower and slower, so as never to reach one hundred per

cent. But where is that point? A long way off, very probably.

Coming now to the second question, the distribution of property's share among the various individual owners of property, we might perhaps be expected to begin by dividing the owners into land-owners and capitalists. It appears, however, that this distinction is of little or no use for our present purpose. The distinction between rent, the income of land-owners, and interest, the income of owners of capital, is a difficult one to deal with when quantitative statements are to be made, since land and capital are divided from each other by no plain and obvious natural boundary line, and there is little agreement as to where to place an arbitrary or imaginary boundary. The difficulties involved in an attempt to estimate "prairie" and "site" values are enormous, and far greater than is imagined by the surveyors who quite truly say they are constantly employed in estimating the value of sites apart from the buildings upon them.<sup>1</sup> But, on the whole, it is probably safe to say that, if a narrow sense be given to "land" when it is taken to mean land in or near its unimproved state then rent is receiving a smaller proportion of the whole income of property than of old. If, however, we take "land" in a wide sense, as including all the great engineering works which are sometimes said to "become incorporated with the land," such as railways, canals, drains, and pipe-lines, to say nothing of buildings, the conclusion will probably be the other way. If these things are included, then rent will be a growing proportion of the income of property. The reason is not far to seek. It is simply that the increase in the quantity of movable and immovable accumulated products of labor is greater

<sup>1</sup> Each site may easily be valued apart from the buildings upon it, but it can seldom, if ever, be valued apart from the buildings on the surrounding sites, and the streets, roads, railroads, which serve it.

than enough to counterbalance the increase in the value of land, of which the quantity is fixed. But all this has little to do with the distribution of income between individuals. No matter where the line be drawn between land and capital, any land-owner can turn himself into a capitalist by selling his land, and any capitalist can turn himself into a land-owner by buying land, so that it is impossible there can be any question of distribution between land-owners and capitalists of equal wealth. To understand the distribution of property's share of income among proprietors, we must treat property as one, and begin by observing what ought to be obvious to every one, that the distribution of the income is directly dependent on the distribution of property. So that we have here simply to explain and classify the causes which govern the distribution of the property. Perhaps the simplest way of making a start will be to assume that we should expect, in the absence of reasons to the contrary, to find property equally distributed. Then we can make the inquiry why, as a matter of fact, some individuals have much, others little, and many scarcely any at all.

The reason which seems to come first in logical order is that all people are not equally provident. As old-fashioned opponents of equalitarian schemes used to say, if we all started with equal amounts, inequality would soon appear, since some of us have more thrifty dispositions, greater desire to provide for the future, than others. Some of us would consequently save considerable amounts from income, while others would save little, and some nothing. Writers exist who speak as if there were no other reason than this for the actual inequality. Mr. Carnegie and the Duke of Westminster, they think, are the thriftiest men alive.

The second reason is that we are not all equally judicious in the selection of investments. Even if we all started

on equal terms and saved the same amount, inequalities would soon arise, since the wise men would make better investments than the fools. Some people think these two reasons are sufficient to account for the existing inequality. Mr. Carnegie and the Duke of Westminster, they think, are not only very thrifty, but also very wise.

The third reason is that men of equal wisdom are not equally lucky in their choice of investments. Only fools invest in lottery tickets, but a few of them do make a thousand or more per cent. and win fortunes. Take a million men of equal wisdom, and you will find their investments better than those of another million men of slightly less wisdom. But that is only because among such large numbers the average luck will be equal. As between single individuals, every one knows that luck plays a great part.

The fourth reason is that earnings are unequal, and it is easier to save out of a large than out of a small income. If, of two men with exactly the same disposition as regards thrift, the one has £5,000 a year, and the other £50, the first will save much more than the second, and consequently eventually become possessed of much more property.

The fifth reason is that persons receive different amounts of property by way of gift, bequest, and inheritance. It is curious to notice how often this reason is overlooked, in spite of its extremely obvious nature. Its effect is cumulative, since, when once a man has acquired large property in this way, it is easier for him to save and acquire still more.

On each of these reasons much might be written. For example, on the last, a great investigation might take place into the different effects of different laws as to inheritance and bequest, into the effect of the customs observed in regard to dowries, the effect of large and small families in

different classes, and many other similar subjects which are just as fitted for discussion in works on economic theory as the matters at present usually discussed,—for example, in relation to the causes of differences of wages in different occupations.

Dislodged from his first and second lines of defence, the apologist for the common failure of writers on Distribution to deal with the division of all income between labor and property and with the distribution of property's share among proprietors may fall back on the third line, and say that these questions are of no importance.

No doubt the importance of the division between property and labor is often exaggerated in the discussions of the market-place and the street. It is often assumed in these discussions that the mere taking away of property's share and giving the whole income to labor would put an end to poverty. To those who believe this it should be pointed out that the allotting of the whole of property's present share to labor as a *pro rata* addition to present earnings would do little to relieve the extreme of poverty. It would certainly abolish the very rich, since the very largest incomes are all chiefly drawn from property; but the addition made to the income of the poorest people would not be sufficient to redeem them from poverty. If property is receiving 30 per cent. of the whole income, the *pro rata* addition to earnings would be about 43 per cent.—a handsome increase, no doubt, to the majority of workers, but one which would be wholly inadequate in the case of the poorest independent earners, and *nil* in the case of the invalid and incapable. Incomes would still range from millions of dollars down to nothing at all. "The whole produce to the laborer" is no panacea. Poverty is a question of persons rather than of categories.

But the fact that a large and active social or political party spread throughout the civilized world do, as a matter

of fact, rightly or wrongly regard "the whole produce to the laborer" as an unimpeachable maxim, must certainly give the question what regulates the proportion of the produce or income received by labor under existing institutions a considerable practical importance. If I understand Professor Clark aright, he would meet the demand made on behalf of the laborer by the proposition that the laborer gets the whole produce of his labor at present. The (say) 30 per cent. of the whole income which the laborers do not get is no part of their produce, but is the produce or part of income attributable to land and capital.<sup>1</sup> This may be a good answer to the exploitation theory of wages, but that theory is mere froth on the surface of the waves. However the socialists may phrase their demand, and whatever obscure arguments they may use in its favor, what they really want is that the laborer should have all the income. They ask for the "whole produce of labor," because Adam Smith and his successors till quite recent times taught that the whole income was produced by labor, so that the income and the produce of labor were synonymous. Now, if Professor Clark and his followers convince them that this is an inaccurate use of language, and that only what labor actually does get, the 70 per cent., for example, is correctly to be spoken of as "the produce of labor," they will promptly say: "Never mind what the other 30 per cent. ought to be called. You can call it what you like, provided you hand it over." To regard the wide-spread popular sentiment that people should not be able to obtain incomes without working for them as the result instead of the cause of the recondite doctrines promulgated by Marx and others as to the exploitation of labor would indicate a remarkable simplicity of mind. The formal pleas of social and political parties can be amended easily enough when they are found to need it.

<sup>1</sup> *Distribution of Wealth*, chap. i.

If it is shown that the term "whole produce of labor" is not properly used of the whole income, the term "whole income" can easily be substituted for it. Socialism will not be exorcised by the marginal productivity theory of wages. But the strength of socialist effort may be greatly affected by an investigation into the causes which regulate the division between labor and property. If, for example, it can be shown that labor's proportion is likely to grow in the future under existing institutions, many people will be satisfied to let things take their course, and will not care to try to accelerate the change, much less to try to carry it to its final and logical conclusion by any violent revolution. If, on the other hand, it appears that labor's proportion is likely to diminish, it is impossible to doubt that the feeling in favor of letting things alone will be much weakened. Moreover, in addition to definitely socialistic proposals, there are many plans for action on the part of the State which cannot be properly understood and appreciated without a knowledge of the causes which regulate the division of income between labor and property. Particular taxes, for example, are often recommended on the ground that they fall on labor or capital, as the case may be. Surely, a thorough knowledge of the theory of the division is necessary before a judgment as to the correctness of the claims made on behalf of particular taxes or systems of taxation can be determined.

Finally, it may be reasonably suggested that the introduction of a theory as to the division between property and labor is necessary for the construction of a theory of wages which will be fairly intelligible to the popular comprehension. He must be a sanguine man who expects to see the marginal productivity theory find a place in the leading articles of newspapers and the speeches of candidates for legislative assemblies. Something rather simpler is required, and something which will fix attention earlier

on the most important factor in practice. This, it seems to me, we get, if we point out that the total amount of earnings at any time depends upon the total produce and the way in which it is divided between labor and property, and that the earnings per worker depend in consequence upon the produce per worker and the way in which the total is divided between labor and property. For the causes of high and low produce per worker we refer to the theory of production, which is wholly or chiefly devoted to an investigation into that question; for the causes of variations in the division we look to the theory of distribution. It is quite possible that the theory of the causes of variation in the division cannot be made any easier than the theory of the marginal productivity of wages. But it can scarcely be more difficult, and at any rate the method I advocate has the great advantage of putting the produce first. This is in practice by far the most important factor. The actual differences of earnings between different countries and different times are evidently far more due to differences of produce per head than to differences in the proportion of the whole taken by property. How ludicrous it would be to propose to bring the earnings of the average inhabitant of India up to those of the average American by a change in the proportion of income allotted to property! The fact is evident to every economist, but is far, as yet, from being an article of common knowledge, as it should be. If we could once get the populace to understand the importance of produce per worker in the determination of wages, we might, I think, feel that we had done the most valuable part of our work, and sleep at night with a fairly good conscience, even if we had not succeeded in making the causes of variation in the division perfectly plain to every one.

It is difficult to imagine any one seriously denying the importance of an inquiry into the nature and comparative

influence of the different causes of the inequality of the distribution of property and property incomes. To imagine that the only, or only considerable, causes are differences of thrift and of judgment in the selection of investments is dangerous as well as absurd. If we are to offer successful criticism of wild schemes, we must keep our eyes open to facts, even of the most obvious character. Every one knows that in all, except the newest "countries," the inequality in the amounts of property which individuals have received by way of bequest and inheritance is by far the most potent cause of inequality in the actual distribution of property. Reflection further suggests that the comparative potency of this cause is likely to grow, rather than to diminish, in the future. As time goes on, the savings of each generation of men must come to bear a smaller and smaller proportion to the property which has come down to them from previous generations. If this were not so, we should be confronted with the prospect of what Malthus called a "geometrical increase" of capital, and should be obliged to consider the necessity of "checks," lest the whole earth should become choked with the accumulations.<sup>1</sup>

Now popular sentiment has rightly—or, as I think, wrongly—a good deal of respect for the idea that, apart

<sup>1</sup> In Professor Seager's *Introduction to Economics*, a work which is happily distinguished by the attention it gives to actual phenomena, I find the following (p. 546):—

"So long as a fair degree of equality of economic opportunity is preserved, the influences which make for the disintegration of large accumulations of wealth are likely to predominate, and the very rich men of each generation are likely to be those who have acquired the greater part of their fortunes during their own lifetimes. This has been the case in the United States up to the present time, and there is nothing in the practice of paying interest and rent for the use of property fairly acquired that threatens to make it less the case in the future."

I venture to suggest that the reason why great fortunes are less often inherited fortunes in America than in Europe is to be found in the fact that America is young and Europe old. Are not hereditary fortunes already obviously growing in comparative importance in America? If existing institutions continued unchanged for five hundred years more, I cannot doubt that the hereditary principle would be as powerful in America then as it is in Europe now.

altogether from considerations of expediency, some more or less obscure ethical reasons demand that thrift and judicious selection of investments should be rewarded; but it cannot in these days be said to have any belief in the ethical propriety of extending the reward to the remotest descendants of the thrifty person, even if these descendants are judicious enough not to get rid of the property bequeathed them. It has not yet succeeded in clearly distinguishing between what it regards as hereditary and what it regards as not hereditary, but it is undoubtedly not now favorable to heredity, considered as an ethical principle of distribution. I cannot imagine that it will become more favorable in the future; and, therefore, it seems to me that attempts to support the existing inequality on ethical grounds must fail.

The argument sometimes put forward by certain religious people, that inequalities are necessary in order that some may exercise the Christian virtue of benevolence, and others that of patience and resignation under suffering, appeals rather to those who are to exercise the benevolence than to those who are to be patient. It is the creed of a trifling minority, and is not likely to exert any considerable influence.

The true defence of the inequalities of the distribution of property is the relative and partial defence afforded by purely economical considerations. It is no part of the economist's business to play the part of the old-fashioned nursery governess who dispensed jam and pudding to her charges in proportions determined by her opinion of each child's comparative merit. The purely economical principle of distribution is that which even she adopted with regard to what she supposed to be the more substantial viands,—the principle of equality modified by differences of need. This is the ideal of distribution, and is aimed at everywhere when production has not to be taken into account. The

economist regards the existing inequality of distribution as in itself extremely wasteful, but sees that it must in the main be retained for the present, because it provides both the motive force and the regulator for the existing system of production; and, even if it were practicable, it would not be worth while to make and introduce the ideal of distribution if it led to a considerable fall in produce per head. The existing inequality, regarded broadly, is, in fact, a necessary evil. But there are many good reasons to suppose that it is greater than is necessary, and for hope, at any rate, that it may in the course of time be largely reduced, if not altogether abolished, without any appreciable injury (or even with advantage) to production. In order to be able to judge correctly whether particular plans for reducing the inequality are desirable or not, we must have a theory as to the causes of the inequality. At present, in considering any particular measures which have a bearing on the subject,—say, for example, the French and British graduated death-duties or laws of inheritance and bequest,—we have to make up our theory specially for the purpose in hand. It would be much better if the groundwork, at any rate, of a theory of distribution were to be found in the ordinary economic text-books.

If the inquiries into the distribution between labor and property and into the distribution of proprietors' income among individual proprietors were to take their proper place in economic theory, "Distribution" as a department of economic theory would of course be remodelled. It would consist of those two inquiries and of the usual inquiry into differences of earnings. The inquiries into general wages, the rate of interest and rent, would be excluded. A great part of these inquiries properly belongs to production and the rest to the theory of value, but for the present it would probably be found convenient to place the inquiry into wages, at any rate, and possibly the other two

inquiries also, after the discussion of Distribution. Their actual position does not make much difference, provided only that it be made perfectly clear that variations in general wages, in the rate of interest, and in absolute amount of rent, do not necessarily coincide or correspond with changes in the distribution of income between those three categories.

EDWIN CANNAN.

LONDON SCHOOL OF ECONOMICS.